

WHAT IS CLAIMED IS:

1. A taste masking composition comprising micropellets containing an antibiotic wherein said micropellets have an inner coating comprising at least one cellulose polymer which is not an enteric coating polymer and an outer coating comprising an enteric coating polymer, wherein said micropellets have a particle size of about 100 μm to about 650 μm .
2. The composition according to Claim 1 wherein the antibiotic has a particle size of about 0.1 μm to about 100 μm .
3. The composition according to Claim 1, wherein the cellulose polymer is selected from the group consisting of hydroxypropylmethyl cellulose, hydroxypropyl cellulose, methyl cellulose, ethyl cellulose, carboxymethylethyl cellulose, sodium carboxymethyl cellulose, ethylcarboxyethyl cellulose, and combinations thereof.
4. The composition according to Claim 3, wherein the cellulose polymer is selected from the group consisting of hydroxypropylmethyl cellulose and hydroxypropyl cellulose.
5. The composition according to Claim 4, wherein the cellulose polymer is hydroxypropylmethyl cellulose.
6. The composition according to Claim 1, wherein the enteric coating is selected from the group consisting of cross-linked polyvinyl pyrrolidone; non-cross linked polyvinylpyrrolidone; hydroxypropylmethyl cellulose phthalate, hydroxypropylmethyl cellulose acetate succinate, cellulose acetate succinate; cellulose acetate phthalate, hydroxypropylmethyl cellulose acetate succinate, cellulose acetate trimellitate, hydroxypropyl methyl cellulose phthalate; hydroxypropyl methyl cellulose acetate succinate; starch acetate phthalate; polyvinyl acetate phthalate; carboxymethyl cellulose; methyl cellulose phthalate; methyl cellulose succinate; methyl cellulose phthalate succinate; methyl cellulose phthalic acid half ester; ethyl cellulose succinate; carboxymethylamide; potassium methacrylatedivinylbenzene copolymer; polyvinylalcohols; polyoxyethyleneglycols; polyethylene glycol; sodium alginate; galactomannane; carboxypolymethylene; sodium carboxymethyl starch; copolymers of acrylic acid and/or methacrylic acid with at least one monomer selected from the group consisting of methyl methacrylate, ethyl methacrylate, ethyl acrylate, butyl methacrylate, hexyl methacrylate, decyl methacrylate, lauryl methacrylate, phenyl methacrylate, methyl acrylate, isopropyl acrylate, isobutyl acrylate, and octadecyl acrylate; polyvinyl acetate; fats;

oils; waxes; fatty alcohols; shellac; gluten; ethylacrylate-maleic acid anhydride copolymer; maleic acid anhydride-vinyl methyl ether copolymer; styrol-maleic acid copolymer; 2-ethyl-hexyl-acrylate maleic acid anhydride; crotonic acid-vinyl acetate copolymer; glutaminic acid/glutamic acid ester copolymer; carboxymethylethylcellulose glycerol monooctanoate; polyarginine; poly(ethylene); poly(propylene); poly(ethylene oxide); poly(ethylene terephthalate); poly(vinyl isobutyl ether); poly(vinyl chloride); polyurethane, and combinations thereof.

7. The composition according to Claim 6, wherein the enteric coating is selected from the group consisting of a copolymer of methacrylic acid and methyl methacrylate, and a copolymer of methacrylic acid and ethyl acrylate.

8. The composition according to Claim 7, wherein the enteric coating is a poly(methacrylic acid, ethyl acrylate)1:1.

9. The composition according to Claim 1, wherein the amount of antibiotic is from about 1 wt. % to about 80 wt. %, based on the total weight of the micropellet.

10. The composition according to Claim 9, wherein the amount of antibiotic is from about 5 wt. % to about 50 wt. %, based on the total weight of the micropellet.

11. The composition according to Claim 10, wherein the amount of antibiotic is from about 20 wt. % to about 35 wt. %, based on the total weight of the micropellet.

12. The composition according to Claim 1 in the form of an oral suspension, capsule, caplet, powder, or tablet.

13. An oral suspension comprising the composition according to Claim 1.

14. A method for preparing a taste masking composition comprising micropellets containing an antibiotic, said method comprising high-shear granulation in the presence of an impeller set at least at 50 rpm, said micropellets having an inner coating comprising at least one cellulose polymer which is not an enteric coating polymer and an outer coating comprising an enteric coating polymer, wherein said micropellets have a particle size of about 100 μm to about 650 μm .

15. A method for preparing a taste masking composition comprising micropellets containing an antibiotic, said method comprising

- (a) mixing at least one antibiotic, and optionally one or more excipients, to form a premix;
- (b) adding a solvent, and optionally one or more excipients, to the premix formed in Step (a) and granulating in the presence of an impeller set at least at 50 rpm, to form a wet granulation;
- (c) drying the wet granulation, and optionally milling and screening the dried granules to form micropellets; and
- (d) coating the micropellets with at least one cellulose polymer; and
- (e) coating the micropellets from Step (d) with at least one enteric coating polymer to form coated micropellets .

- 16. The method according to Claim 14, wherein the high-shear granulation is additionally conducted in the presence of a chopper.
- 17. The method according to Claim 16, wherein the chopper is set at least at 1000 rpm.
- 18. The method according to Claim 15 wherein the solvent is water.
- 19. The method according to Claim 15 wherein the antibiotic is clarithromycin.
- 20. The method according to Claim 15 wherein the excipient is selected from the group consisting of a binder, diluent, anti-caking agent, amino acid, filler, solubilizer, disintegrant, lubricant, emulsifier, flavorant, solvent, stabilizer, anti-oxidant, anti-adherent, preservative, electrolyte, glidant, and combinations thereof.